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EXAMINER
DANIEL JR, WILLIE J

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Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

PTOL-90A (Rev. 04/07)

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE _3_ MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☒ Responsive to communication(s) filed on _12 March 0207_.

2a)☐ This action is **FINAL**.   2b)☒ This action is non-final.

3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4)☒ Claim(s) _1-9_ is/are pending in the application.

   4a) Of the above claim(s) _____ is/are withdrawn from consideration.

5)☐ Claim(s) _____ is/are allowed.

6)☒ Claim(s) _1-9_ is/are rejected.

7)☐ Claim(s) _____ is/are objected to.

8)☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9)☐ The specification is objected to by the Examiner.

10)☐ The drawing(s) filed on _____ is/are: a)☐ accepted or b)☐ objected to by the Examiner.

   Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

   Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

11)☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

12)☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

   a)☐ All b)☐ Some * c)☐ None of:

   1.☐ Certified copies of the priority documents have been received.

   2.☐ Certified copies of the priority documents have been received in Application No. _____.

   3.☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

   * See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

1) ☒ Notice of References Cited (PTO-892)

2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)

3) ☐ Information Disclosure Statement(s) (PTO/SB/08)
   Paper No(s)/Mail Date _____.

4) ☐ Interview Summary (PTO-413)
   Paper No(s)/Mail Date. _____ .

5) ☐ Notice of Informal Patent Application

6) ☐ Other: _____.

DETAILED ACTION

1. This action is in response to applicant's communication filed on 12 March 2007. **Claims 1-9**

are now pending in the present application. This office action is made **Non-Final**.

Continued Examination Under 37 CFR 1.114

2.   A request for continued examination under 37 CFR 1.114, including the fee set forth

in 37 CFR 1.17(e), was filed in this application after final rejection. Since this application is

eligible for continued examination under 37 CFR 1.114, and the fee set forth in 37 CFR

1.17(e) has been timely paid, the finality of the previous Office action has been withdrawn

pursuant to 37 CFR 1.114. Applicant's submission filed on 12 March 2007 has been entered.

Claim Rejections - 35 USC § 112

3. The following is a quotation of the first paragraph of 35 U.S.C. 112:

> The specification shall contain a written description of the invention, and of the manner and process of making
> and using it, in such full, clear, concise, and exact terms as to enable any person skilled in the art to which it
> pertains, or with which it is most nearly connected, to make and use the same and shall set forth the best mode
> contemplated by the inventor of carrying out his invention.

Claims 1-2 and 7 are rejected under 35 U.S.C. 112, first paragraph, as failing to comply with

the written description requirement. The claim(s) contains subject matter which was not

described in the specification in such a way as to reasonably convey to one skilled in the

relevant art that the inventor(s), at the time the application was filed, had possession of the

claimed invention.

   a.   Claims 1-2 and 7 include the limitation "...**continuously** sending a message..." as

       recited in line(s) 6-7 of claim 1.

Regarding **claims 1-2 and 7**, the claim(s) include(s) a limitation that is not supported by the specification of the instant application as originally filed. The applicant is advised to review the subject matter of the specification (see pg. 5, lines 6-11), which at best describes a base station forwarding a message. Consequently, there is no language in the specification that describes the limitation "...continuously..." as recited in said claims. Applicant is advised to clearly and concisely provide claim language that is consistent and correlates to the specification and mindful not to improperly utilized language that is clearly not supported. The Examiner respectfully requests the applicant to provide page(s), line(s), and figure(s) of the instant application that supports the limitation of the claim(s) and/or any supportive comment(s) to help clarify and resolve this issue(s).

4. Due to the new matter language provided in the response filed on 12 March 2007 which is after the instant application **was** originally filed, the Examiner has given a reasonable interpretation of said language and the claims are rejected as broadest and best interpreted.

5. This list of examples is not intended to be exhaustive. The Examiner respectfully requests the applicant to review all claims and clarify the issues as listed above as well as any other issue(s) that are not listed.

Claim Rejections - 35 USC § 103

6. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness

rejections set forth in this Office action:

> (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in
> section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are
> such that the subject matter as a whole would have been obvious at the time the invention was made to a person
> having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the
> manner in which the invention was made.

Claims 1-9 are rejected under 35 U.S.C. 103(a) as being unpatentable over **Lu et al.**

(hereinafter Lu) **(US 5,99,813)** in view of **Chawla et al.** (hereinafter Chawla) **(US 6,771,661**

B1).

Regarding **claim 1**, Lu discloses a cellular cPBX system (200) which reads on the

claimed "wireless corporate communication system" comprising a private branch exchange

(cPBX 206), at least one base station (210) coupled with said private branch exchange (206),

and a plurality of mobile station units (MS 212) which reads on the claimed "corporate radio

terminals" under the range of said base station (210) (see col. 6, lines 42-55; Figs. 3A-4A, 7),

wherein

said private branch exchange (206) comprises means (254, RR - radio resource manager)

for controlling the amount of resources allocated to each of said corporate radio terminals

(212) (see col. 18, lines 44-60; col. 6, lines 44-55; col. 7, lines 4-10; col. 8, lines 11-24,41-47;

col. 10, lines 1-3; col. 5, lines 16-28; Figs. 3A-4A, 7), where the cPBX allocates resources to

mobile stations (212) in the cPBX system (206). Lu further discloses having the feature said

base station (BTS 210) (see Fig. 3A), where the BTS provides the resources to the mobile

units (212). Lu does not specifically disclose having the feature said base station comprising

means for continuously sending a message indicating to said corporate radio terminals the

amount of resources they are allocated. However, the examiner maintains that the feature said base station comprising means for continuously sending a message indicating to said corporate radio terminals the amount of resources they are allocated was well known in the art, as taught by Chawla.

In the same field of endeavor, Chawla discloses the feature said base station comprises means for continuously (e.g., automatically and dynamically) sending a allocation information which reads on the claimed "message" indicating to said voice, facsimile, computer terminal (210, 211, 212) which reads on the claimed "corporate radio terminals" the amount of bandwidth which reads on the claimed "resources" they are allocated (see col. 10, line 65 - col. 11, line 34; col. 11, lines 55-62; col. 12, lines 6-25; col. 13, lines 6-20; Figs. 3-5), where the data communications device (201-1, e.g., PBX) provides bandwidth to the terminals (210) of the communication network (200) in which each terminal is provided with allocation information and the base station and means would be inherent for communicating over a wireless transmission link as evidenced by the fact that one of ordinary skill in the art would clearly recognize (see col. 12, lines 22-25). The system automatically and dynamically adjusts the amount of bandwidth for communication sessions according to situations such as times or events.

Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to combine the teachings of Lu and Chawla to have the feature said base station comprising means for continuously sending a message indicating to said corporate radio terminals the amount of resources they are allocated, in order to allow data

communication devices to automatically and dynamically adjust bandwidth, as taught by

Chawla (see col. 12, lines 19-32; col. 8, lines 37-46).

Regarding **claim 2**, Lu discloses a private branch exchange adapted to be coupled to a

base station (210), said private branch exchange (206) comprising a BSC (208) which reads

on the claimed "switch" establishing communications to/from corporate radio terminals (212)

located under the range of said base station (210) (see col. 7, lines 4-10; col. 8, lines 11-

24,41-47; col. 10, lines 1-3; Figs. 3A-4A, 7), wherein said private branch exchange (206)

comprises:

means (254) for controlling the amount of resources allocated to each of said corporate

radio terminals (212) (see col. 18, lines 44-60; col. 6, lines 44-55; col. 7, lines 4-10; col. 8,

lines 11-24,41-47; col. 10, lines 1-3; col. 5, lines 16-28; Figs. 3A-4A, 7), where the cPBX

allocates resources to mobile stations (212) in the cPBX system (206). Lu further discloses

having the feature said base station (BTS 210) (see Fig. 3A), where the BTS provides the

resources to the mobile units (212). Lu does not specifically disclose having the features

means for sending messages to said base station comprising the amount of resources

allocated to each of said corporate radio terminal, wherein said base station continuously

sends a message which indicates to each of said corporate radio terminals the amount of

resources it is allocated. However, the examiner maintains that the feature means for sending

messages to said base station comprising the amount of resources allocated to each of said

corporate radio terminal, wherein said base station continuously sends a message which

indicates to each of said corporate radio terminals the amount of resources it is allocated was

well known in the art, as taught by Chawla.

Chawla further discloses the features

means for sending allocation information which reads on the claimed "messages" to said

base station comprising the amount of resources (bandwidth) allocated to each of said

corporate radio terminal (210) (see col. 10, line 65 - col. 11, line 34; col. 11, lines 55-62; col.

12, lines 6-25; col. 13, lines 6-20; Figs. 3-5, 7 "ref. 500"), where the data communications

device (201-1, e.g., PBX) provides bandwidth to the terminals (210) according to the

bandwidth information (e.g., event, times, topology changes, or occurrences) in which the

base station and means would be inherent for communicating over a wireless transmission

link,

wherein said base station continuously (e.g., automatically and dynamically) sends a

message which indicates to each of said corporate radio terminals (210) the amount of

resources it (210) is allocated (see col. 10, line 65 - col. 11, line 34; col. 11, lines 55-62; col.

12, lines 6-25; col. 13, lines 6-20; Figs. 3-5), where the data communications device (201-1,

e.g., PBX) provides bandwidth to the terminals (210) of the communication network (200) in

which each terminal is provided with allocation information and the base station would be

inherent for communicating over a wireless transmission link as evidenced by the fact that

one of ordinary skill in the art would clearly recognize (see col. 12, lines 22-25). The system

automatically and dynamically adjusts the amount of bandwidth for communication sessions

according to situations such as times or events.

Therefore, it would have been obvious to one of ordinary skill in the art at the time

the invention was made to combine the teachings of Lu and Chawla to have the feature

means for sending messages to said base station comprising the amount of resources

allocated to each of said corporate radio terminal, wherein said base station continuously

sends a message which indicates to each of said corporate radio terminals the amount of

resources it is allocated, in order to allow data communication devices to automatically and

dynamically adjust bandwidth, as taught by Chawla (see col. 12, lines 19-32; col. 8, lines 37-

46).

Regarding **claim 3**, Lu discloses a private branch exchange (206) according to claim

2, further comprising a registry (252) which reads on the claimed "database" storing user

profiles of said corporate radio terminals (212) (see col. 7, line 59 - col. 8, line 10; col. 9,

lines 8-13; col. 27, lines 34-45; Figs. 3A-4A, 7, 13A), where the HLR/VLR registry

(database) maintain information of the user for providing services in which the profile would

be obvious. Lu does not specifically disclose having the feature said amount of resources

allocated to a corporate radio terminal depending on the profile of said corporate radio

terminal stored in said database. However, the examiner maintains that the feature said

amount of resources allocated to a corporate radio terminal depending on the profile of said

corporate radio terminal stored in said database was well known in the art, as taught by

Chawla.

Chawla further discloses the feature said amount of resources (bandwidth) allocated

to a corporate radio terminal (210) depending on the profile of said corporate radio terminal

(210) stored in said network policy resource allocation table (400) which reads on the

claimed "database" (see col. 13, line 7 - col. 14, line 58; col. 10, line 65 - col. 11, line 34; col.

11, lines 55-62; col. 12, lines 6-25; Figs. 3-5, 6 "ref. 400", 7), where the data

communications device (201-1, e.g., PBX) has a table (400) for indicating the resources to be

allocated to the terminals (210) such as during a typical twenty-four hour period in which the profile would be inherent for providing an individual terminal with resources.

Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to combine the teachings of Lu and Chawla to have the feature said amount of resources allocated to a corporate radio terminal depending on the profile of said corporate radio terminal stored in said database, in order to allow data communication devices to automatically and dynamically adjust bandwidth, as taught by Chawla (see col. 8, lines 37-46).

Regarding **claim 4**, Lu discloses a cPBX system (200) (see Figs. 3A-4A, 7), where the system (200) is connected to a public network (202). Lu does not specifically disclose having the feature wherein said amount of resources allocated to a corporate radio terminal communicating with a public communication network over said corporate communication system depends on the effective amount of data destined to said corporate radio terminal and received at the interface between said corporate communication system and said public communication network. However, the examiner maintains that the feature wherein said amount of resources allocated to a corporate radio terminal communicating with a public communication network over said corporate communication system depends on the effective amount of data destined to said corporate radio terminal and received at the interface between said corporate communication system and said public communication network was well known in the art, as taught by Chawla.

Chawla further discloses the feature wherein said amount of resources allocated to a corporate radio terminal (210) communicating with a public communication network (e.g.,

Internet, extranets, or WAN's) over said corporate communication system (200) depends on the effective amount of data destined to said corporate radio terminal (210) and received at the interface between said corporate communication system (200) and said public communication network (e.g., Internet, extranets, or WAN's) (see col. 10, line 65 - col. 11, line 34; col. 11, lines 55-62; col. 12, lines 6-32; Figs. 3-5, 7), where the data communications device (201-1, e.g., PBX) provides resources to be allocated to the terminals (210) for communicating with connected networks.

Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to combine the teachings of Lu and Chawla to have the feature wherein said amount of resources allocated to a corporate radio terminal communicating with a public communication network over said corporate communication system depends on the effective amount of data destined to said corporate radio terminal and received at the interface between said corporate communication system and said public communication network, in order to allow data communication devices to automatically and dynamically adjust bandwidth, as taught by Chawla (see col. 8, lines 37-46).

Regarding **claim 5**, the combination of Lu and Chawla discloses every limitation claimed, as applied above (see claim 2), in addition Lu further discloses a private branch exchange (206) according to claim 2, wherein said amount of resources allocated to a corporate radio terminal (212) depends on the amount of traffic in said private branch exchange (206) (see col. 8, lines 11-24,41-47; col. 18, lines 44-60; Figs. 3A-4A, 7).

Regarding **claim 6**, Lu discloses every limitation claimed as applied above in claim 2. Lu does not specifically disclose having the feature wherein said amount of resources

allocated to a corporate radio terminal is dynamically updated during a communication

to/from said corporate radio terminal. However, the examiner maintains that the feature

wherein said amount of resources allocated to a corporate radio terminal is dynamically

updated during a communication to/from said corporate radio terminal was well known in the

art, as taught by Chawla.

Chawla further discloses the feature wherein said amount of resources allocated to a

corporate radio terminal (210) is dynamically updated during a communication to/from said

corporate radio terminal (210) (see col. 10, line 65 - col. 11, line 34; col. 11, lines 55-62; col.

12, lines 6-25,33-57; Figs. 3-5, 7).

Therefore, it would have been obvious to one of ordinary skill in the art at the time

the invention was made to combine the teachings of Lu and Chawla to have the feature

wherein said amount of resources allocated to a corporate radio terminal is dynamically

updated during a communication to/from said corporate radio terminal, in order to allow data

communication devices to automatically and dynamically adjust bandwidth, as taught by

Chawla (see col. 8, lines 37-46).

Regarding **claim 7**, Lu discloses a base station (210) adapted to be coupled to a

private branch exchange (206) comprising a TRX module (530) which reads on the claimed

"module" for sending data which reads on the claimed "messages" to corporate radio

terminals (212) under the range of said base station (210) (see col. 19, lines 34-38,61; col. 20,

lines 1-27; Figs. 3A-4A, 7-9). Lu further discloses having the feature said base station (BTS

210) (see Fig. 3A), where the BTS provides the resources to the mobile units (212). Lu does

not specifically disclose having the feature continuously indicating the amount of resources

each of said corporate radio terminal is allocated, said amount of resources being determined

by said private branch exchange. However, the examiner maintains that the feature

continuously indicating the amount of resources each of said corporate radio terminal is

allocated, said amount of resources being determined by said private branch exchange was

well known in the art, as taught by Chawla.

Chawla further discloses the feature continuously (e.g., automatically and

dynamically) indicating the amount of resources each of said corporate radio terminal (210)

is allocated, said amount of resources being determined by said private branch exchange

(201-1) (see col. 10, line 65 - col. 11, line 34; col. 11, lines 55-62; col. 12, lines 6-25; col. 13,

lines 6-20; Figs. 3-5, 7), where the system automatically and dynamically adjusts the amount

of bandwidth for communication sessions according to situations such as times or events in

which each terminal is provided with allocation information (or message).

Therefore, it would have been obvious to one of ordinary skill in the art at the time

the invention was made to combine the teachings of Lu and Chawla to have the feature

continuously indicating the amount of resources each of said corporate radio terminal is

allocated, said amount of resources being determined by said private branch exchange, in

order to allow data communication devices to automatically and dynamically adjust

bandwidth, as taught by Chawla (see col. 8, lines 37-46).

Regarding **claim 8**, Lu discloses every limitation claimed as applied above in claim 1.

Lu does not specifically disclose having the feature wherein said amount of resources

allocated to each of said corporate radio terminal is dynamically updated during a

communication to/from said corporate radio terminal. However, the examiner maintains that

the feature wherein said amount of resources allocated to each of said corporate radio

terminal is dynamically updated during a communication to/from said corporate radio

terminal was well known in the art, as taught by Chawla.

Chawla further discloses the feature wherein said amount of resources allocated to

each of said corporate radio terminal (210) is dynamically updated during a communication

to/from said corporate radio terminal (210) (see col. 10, line 65 - col. 11, line 34; col. 11,

lines 47-62; col. 12, lines 6-25,33-57; Figs. 3-5, 7), where the resources is dynamically

adjusted for the terminals, for example, during times of day for business cycle.

Therefore, it would have been obvious to one of ordinary skill in the art at the time

the invention was made to combine the teachings of Lu and Chawla to have the feature

wherein said amount of resources allocated to each of said corporate radio terminal is

dynamically updated during a communication to/from said corporate radio terminal, in order

to allow data communication devices to automatically and dynamically adjust bandwidth, as

taught by Chawla (see col. 12, lines 19-32; col. 8, lines 37-46).

Regarding **claim 9**, Lu discloses every limitation claimed as applied above in claim 7.

Lu does not specifically disclose having the feature wherein said amount of resources is

dynamically updated during a communication to/from said corporate radio terminal.

However, the examiner maintains that the feature wherein said amount of resources is

dynamically updated during a communication to/from said corporate radio terminal was well

known in the art, as taught by Chawla.

Chawla further discloses the feature wherein said amount of resources is dynamically

updated during a communication to/from said corporate radio terminal (210) (see col. 10, line

65 - col. 11, line 34; col. 11, lines 47-62; col. 12, lines 6-25,33-57; Figs. 3-5, 7), where the amount of resources is dynamically adjusted.

Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to combine the teachings of Lu and Chawla to have the feature wherein said amount of resources allocated is dynamically updated during a communication to/from said corporate radio terminal, in order to allow data communication devices to automatically and dynamically adjust bandwidth, as taught by Chawla (see col. 12, lines 19-32; col. 8, lines 37-46).

Response to Arguments

7.   Applicant's arguments with respect to claims 1-9 have been considered but are moot

in view of the new ground(s) of rejection necessitated by the amended language and/or new

limitations.

In response to applicant's arguments, the Examiner respectfully disagrees as the

applied reference(s) provide more than adequate support and to further clarify (see the above

claims for relevant citations).

Conclusion

8.   The prior art made of record and not relied upon is considered pertinent to applicant's

disclosure.

   a. Waclawsky et al. (US 7,116,682 B1) discloses a methods and apparatus for dynamic

   bandwidth adjustment.

   b. Ozluturk (US 2002/0080744 A1) discloses a CDMA communication system which

   selectively allocates bandwidth upon demand.

9.   Any inquiry concerning this communication or earlier communications from the

examiner should be directed to Willie J. Daniel, Jr. whose telephone number is (571) 272-

7907. The examiner can normally be reached on 8:30-4:30.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's

supervisor, Charles Appiah can be reached on (571) 272-7904. The fax phone number for

the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent

Application Information Retrieval (PAIR) system. Status information for published

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Representative or access to the automated information system, call 800-786-9199 (IN USA

OR CANADA) or 571-272-1000.

/WJD,JR/

WJD,JR
14 May 2007

CHARLES N. APPIAH
SUPERVISORY PATENT EXAMINER